



UNIVERSITY  
OF  
JOHANNESBURG

Department of Finance and Investment Management

## BANKING OPERATIONS 2B BOP22B2

### SUPPLEMENTARY EXAMINATION

Date of Examination: January 2018

Time: 2 hours

Marks: 80

Assessor: Mrs M Lepheana

Internal Moderator: Mr J Mabejane

#### INSTRUCTIONS:

This paper consists of 8 pages (including the cover page).

- Answer all questions.
- Write neatly and legibly.
- Pocket calculators are permitted.
- Calculations should be rounded to two decimal places.
- All workings must be shown.

Question	Topic	Marks	Time
1	All the topics	10	15 minutes
2	The money market	22	35 minutes
3	The bond market	21	35 minutes
4	The equity market	11	15 minutes
5	The derivative market & the Forex market	16	20 minutes
		<b>80</b>	<b>120 minutes</b>

**QUESTION 1****[10]**

1.1 What is the settlement amount of a bond with a principal of R1 million and an annual coupon rate of 9 per cent that is trading at an all-in price of R98,00 per cent if the clean price is R97,50 per cent?

- A. R975 000
- B. R980 000
- C. R1 000 000
- D. R1 090 000

1.2 Stern buys previously traded shares in company A on the JSE. The price at which Stern bought the shares is referred to as the

- A. par value
- B. market value
- C. book value
- D. intrinsic value

1.3 Holding a long call option, with the premium of R5 and a strike price of R50 when the underlying asset is trading at R70, implies that the position is

- A. out-of-the-money and showing a loss of R20
- B. in-the-money and showing a profit of R15
- C. out-of-the-money and showing a loss of R15
- D. in-the-money and showing a profit of R20

1.4 What is the annual interest payment on a R1 million bond with a coupon rate of 5 per cent and a yield-to-maturity (YTM) of 8 per cent?

- A. R40 000
- B. R50 000
- C. R80 000
- D. R100 000

1.5 A bond with a call feature is most likely to be called when

- A. the bond's yield to maturity increases above its coupon rate
- B. the bond's market price falls below its par value
- C. market interest rates rise above the bond's coupon rate

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D. market interest rates fall below the bond's coupon rate

1.6 A bond that grants the bondholder the right to convert it to a specific predetermined number of shares of the issuing company is called a

- A. redeemable bond
- B. convertible bond
- C. exchangeable bond
- D. bond with share warrant attached

1.7 Which ONE of the following is the key difference between ordinary and preference shares?

- A. The tax treatment of dividends received by the shareholder
- B. Priority in terms of rights to distribution of earnings
- C. The tax treatment of dividends paid by the issuing company
- D. Shareholder liability in the event of liquidation of the issuing company

1.8 The issuing of shares by a company for the attainment of assets not already listed is called

- A. a capitalisation issue
- B. a rights offer
- C. a claw-back offer
- D. an acquisition issue

1.9 Peter needs to convert ZAR 1 million into USD. He receives the following quotes:

- Bank A: USD/ZAR 8,1850/8,1875
- Bank B: USD/ZAR 8,1845/8,1880

Which bank offers Peter the best deal, and what amount of USD will he receive if he deals with this bank?

- A. Bank A; and Peter will receive USD 122 137,40
- B. Bank A; and Peter will receive USD 8 185 000,00
- C. Bank B; and Peter will receive USD 122 182,17
- D. Bank B; and Peter will receive USD 8 187 500,00

1.10 Which of the following statements about interest rate swaps are correct?

- i. They are regarded as off-balance sheet financial instruments.

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- ii. During the life of the swap, payments between the two parties are based on a notional principal amount.
  - iii. The periodic payments are executed in two different currencies.
  - iv. The two parties exchange their individual debt obligations on reference dates.

- A. (i) and (ii) only
- B. (iii) and (iv) only
- C. (i), (ii) and (iii) only
- D. (i), (iii) and (iv) only

**QUESTION 2****[22]****2.1 Define the following terms:****(12)**

- a) Marketability
- b) Interbank market
- c) Interest add on instrument
- d) Consideration
- e) Repurchase agreement
- f) Proceeds

2.2 Tswelopele Fund Management Pty Ltd wants to invest in a R5 million Treasury Bill with maturity period of 72 days at 11% discount rate.

- a) How much is he going to pay for the Treasury Bill? (3)
- b) What is his interest income/ return on this investment? (3)
- c) What is the yield of this investment? (3)
- d) Is TB a discount or interest add on instrument? (1)

**QUESTION 3****[21]**

3.1 The bond market forms part of the capital market and debt market. it is the long-term debt market.

- a) Discuss any five different types of government bonds. (10)
- b) Explain stripping. (2)

3.2 A bond is issued with details as follows:

Principal value: R10, 000, 000

Coupon rate: 10%

Coupon payment dates: 30 June and 31 December

Registration closing dates: 10 June and 11 December

Issue date: 1<sup>st</sup> July 2017

Maturity date: 31<sup>st</sup> December 2027

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The bond was traded for settlement on the 15<sup>th</sup> August 2019 at a yield of 15%.

- a) Is the bond trading cum or ex interest? Provide an explanation for your answer. (3)
- b) What is the accrued interest for the bond? (3)
- c) Suppose the clean price of the bond is R9, 000,000, what is its All-in-price? (3)

**QUESTION 4****[11]**

The equity market and bond market together form the capital market. This is where companies and government raise funds to finance capital investments and expansion projects.

- 4.1 Preference shares has both the features of ordinary shares and debt. List these features. (6)
- 4.2 List five different types of preference shares. (5)

**QUESTION 5****[16]**

- 5.1 Derivatives are financial instruments that derive their value from the values of the underlying securities and other variables.
  - a) Discuss the factors that distinguish future contracts from forward contracts. (8)
  - b) Differentiate between: (4)
    - i. American and European option
    - ii. Vanilla and exotic option
- 5.2 The foreign exchange market is the mechanism by which participants transfer purchasing power between countries, obtain or provide credit for international trade transactions, and minimize exposure to the risks of exchange rate changes.
  - b) Discuss the two different types of purchasing power parity. (4)